## AN OVERVIEW OF MOLD

Presented by:

Jessica Morton

NH Department of Environmental Services

Indoor Air Quality Program

603-271-3911



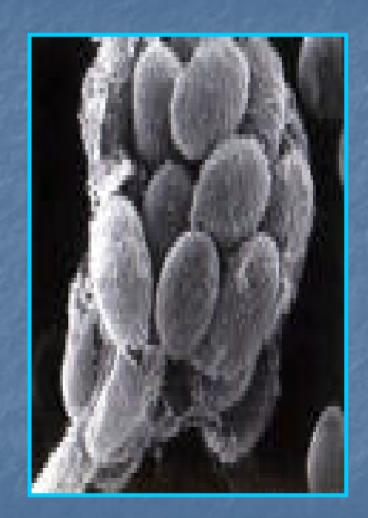
## Points to Discuss...MOLD

- What is it?
- How does it grow?
- Where does it grow?
  - Health effects
    - Types
    - Testing
    - Clean Up

#### What is Mold?

- Mold spores are simple, microscopic organisms, found virtually everywhere
- Mold spores are very tiny and lightweight, allowing them to waft (travel) through the air
- Mold is an allergen, not a poison
- When molds are present, they can cause allergic symptoms similar to those caused by plant pollen









Magnified mold spores.

Molds can gradually destroy the things they grow on. You can prevent damage to your home and furnishings, save money, and avoid potential health problems by controlling moisture and eliminating mold growth.

#### How Does Mold Grow?

- Water or moisture is necessary
- Molds reproduce by means of tiny spores
- Mold requires food sources such as leaves, wood, paper products, wall board, insulation, ceiling tiles and other organic based materials.
- Take prompt action when mold is discovered



Mold growing on fallen leaves.



Mold on Strawberries





Snow Mold



## Attics & Basements





## Ceilings







Condensation on the inside of a windowpane. Water stain on a basement wall - locate and fix the source of the water promptly.









## Where Flood Waters Flow ...









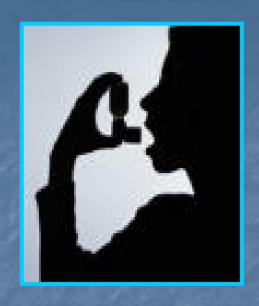
## Should You Be Concerned About Mold Growth?

- Exposure to mold spores may cause health problems
- A damp environment and mold growth will cause structural damage to your home
- Housing resale problems

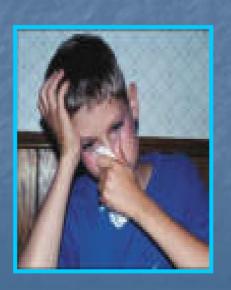
#### Who Is Affected?

Anyone at anytime

- At a higher risk:
  - Infants and children
  - Elderly
  - Individuals with respiratory conditions, allergies and/or asthma
  - Immune compromised individuals







#### Possible Health Problems

- When moisture problems occur and mold growth results, building occupants may begin to report odors and a variety of health complaints.
- Molds produce allergens (substances that can cause allergic reactions).
- Irritant to eyes, ears, nose, throat, lungs and skin.

# Are Some Molds More Hazardous Than Others?

- All molds are considered a potential health concern
- Individual response
- Potential of toxic substances called mycotoxins, endotoxins given off by mold spores.
- No amount of indoor mold is sanitary or desirable

## Potentially Toxic Molds

- Stachybotrys atra. Flooded areas, running water leaks, and cellulose material.
- Penicillium sub-species. Below grade living areas and storage caves.
- Aspergillus and aflatoxins. Common to all dark, damp areas.
- Cladasporium. Common to soils and damp areas.

## Mold In My Home?

**HISTORY** water source

**LOOK** for water stains or cottony or speckled growth on ceilings or walls

**SMELL** an earthy or musty odor

**EXPERIENCE** upper respiratory symptoms

## Should I Test For Mold?

Mold testing is not recommended as a first step approach to a mold problem

 Test results offer limited information and should be interpreted by an environmental professional

\$ Can be very expensive \$

## MOLD CLEANUP

# Should I clean my home or hire a professional?



Cleaning while wearing N-95 respirator, gloves and goggles.



## www.iaqcouncil.org

## Do It Yourself Mold Cleanup Tips ACT QUICKLY

- Identify
- Repair
- Wear personal protective equipment (PPE)
- Dispose of porous moldy items / When in doubt ... throw it out
- Clean and dry the area immediately
- Recheck and recheck for re-growth OR
- Interview and hire a Professional Certified Mold Remediator







## Legislation and Standards

- Nationally, Standards or Threshold Limit Values (TLVs) for airborne concentrations of mold spores have NOT been established.
- NH does NOT have state regulations or standards for airborne mold contaminants.
- NH does NOT certify or license mold remediators. It's a "buyer beware" market.

## Home Owners & Tenants

Avoid living in a basement apartment if you have asthma and/or known allergies to mold spores and dust mites

Know what to look for before buying or leasing

Contracts: buyer beware

Report findings to landlord immediately and file a 540A petition with the court.

Conduct regular walk thru assessments of your living environment

# Tips to Help Prevent Indoor Mold Growth

- Provide adequate ventilation
- Keep humidity levels below 60%
- All carpets shampooed must be dried quickly
- Minimize condensation around plumbing pipes and toilet fixtures
- Operate air conditioners, vent fans and dehumidifiers to reduce moisture levels.
- Repair water/plumbing leaks and flood damage immediately
- Conduct routine walk through inspections of your home

#### CONCLUSION

"An ounce of prevention is worth a pound of cure"

- The key to mold control is moisture control
- Solve moisture problems before they become mold problems
- Conduct a walk thru inspection of your indoor environment on a regular basis
- Keep indoor environments clean and dry

#### For More Information

NH Department of Environmental Services
Air Resources Division
Indoor Air Quality Program
29 Hazen Drive, Concord, NH 03301
603-271-3911; <a href="mailto:linearing-li

US Environmental Protection Agency
www.epa.gov
US Centers for Disease Control and Prevention
www.cdc.gov